cornis has metallic green elytra, and Jacoby writes that it strongly resembles a species of Palaeothona except for the closed coxal cavities. The only species of Cyrsylus examined by me, C. recticollis, is similar in size and shape to cyanipennis, the only marked difference being in the elytral punctation which is regularly striate punctate throughout. The head has a similar sculpture, the thorax is rectangular with oblique anterior angles, and a straight margined base. The first joint of the hind tarsus is long and appears to be likewise dilated in the male. The aedeagus, while not having the peculiar divided apex, is long, slender and not much curved.

This species has also been collected at Fajario, Puerto Rico, by August Busck in February 1899 and at Christiansted, St. Croix, by H. A. Beatty.

## Cyrsylus hispaniolae, n. sp.

Fig. 4
From $4-4.5 \mathrm{~mm}$ in length, oval, lustrous, yel-low-brown with deep blue elytra, elytra distinctly punctate.

期
Head shining, smooth, impunctate. Antennae with second and third joints subequal, fourth and remaining nearly twice as long as third, pale yellow-brown. Prothorax very finely and indistinctly punctate, about one-fourth as long as elytra. Elytra broad and convex with distinct rows of punctures in basal part, and between these rows of coarser punctures a row of finer, indistinct punctures; below the transverse depression the punctation becoming confused; occasionally the rows somewhat impressed. First
joint of hind tarsus long and in the male dilated. Length $3.9-4.5$; width $2-2.3 \mathrm{~mm}$.

Type male and 12 paratypes U.S.N.M. no. 59317, 2 paratypes in Museum of Comparative Zoology, Cambridge, Mass.

Type locality.-Froide River Valley, Haiti, collected on January 28, 1925, by W. A. Hoffman.

Remarks.-Except for the points noted above, this species is much like C. cyanipennis (Weise). It is the largest and most robust of the three species with the most distinct punctation.

Cyrsylus montserrati, n. sp.
Fig. 7
About 3 mm in length, elongate, lustrous, reddish brown with deep blue elytra.

Head shining, smoothly rounded over occiput with a few fine punctures on top, paler in lower front. Antennae with third joint about the same length as second and shorter than fourth. Thorax finely punctate, the sides nearly straight, about one-fourth as long as elytra. Elytra with fine striate punctures becoming confused behind the transverse impression. Undersurface lustrous. First joint of hind tarsi not quite as long as the rest together, dilated in the male. Length 2.9 mm ; width 1.4 mm .

Type male, U.S.N.M. no. 59318.
Type locality.-Montserrat, West Indies, collected on March 18 by H. G. Hubbard.

Remarks.-This species, very similar in most points to the two preceding ones, is the smallest and the most finely punctate and also is more slender.

ZOOLOGY. - Echinoderms from the mid-Atlantic dredged by the Atlantis in the summer of $1948 .{ }^{1}$ Austin H. Clark, U. S. National Museum.

Through Dr. Louis W. Hutchins the Woods Hole Oceanographic Institution has submitted to me for study an unusually interesting collection of sea-stars, brittlestars, sea-urchins, and sea-ilies from the mid-Atlantic, largely from the general vicinity of the Azores. This collection was made by the Atlantis of the Woods Hole Oceanographic Institution on cruise no. 152, sponsored jointly by the National Geographic Society, Cohumbia University, and

[^0]the Woods Hole Oceanographic Institution. It is especially interesting in including a number of species that have not been found since the days of the Challenger, Travailleur, Talisman, Hirondelle, and Princesse-Alice. For the pleasure of studying this collection I am deeply indebted to the Woords Hole Oceanographic Institution and to Dr. Hutchins.

## ASTEROIDEA

## Astropectinidae

## Leptychaster arcticus (M. Sars)

. 1 stropecten arcticus M. Sars, Reise i Lofoten og Finmarken, Nyt Mag. for Naturvid. 6:161. 1851.

Locality.-Atlantis cruise 152, station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ}$ $53^{\prime}$ W.); 85 fathoms; July 31, 1948. Thirteen specimens.
Note.-In all the specimens $\mathrm{R}=$ about 30 mm .
Plutonaster notatus Sladen
Plutonaster notatus Sladen, Challenger Reports, Zoology, 30 (pt. 51): 97, pl. 14, figs. 6, 7, pl. 15, figs. 5, 6. 1889.

Locality.-Atlantis cruise 152, station 28; southwest of the Azores (lat. $34^{\circ} 50^{\prime} \mathrm{N}$., long. $39^{\circ} 20^{\prime}$ W.); 1,770 fathoms; August 30, 1948. Three specimens.

Notes.-One of the specimens measures $\mathrm{R}=$ $25 \mathrm{~mm} ., \mathrm{r}=8 \mathrm{~mm}$.; in the other two $\mathrm{R}=22$ $\mathrm{mm} ., \mathrm{r}=8 \mathrm{~mm}$. In one specimen many and in the others a few of the papillae on the abactinal surface have 2 to 4 (usually 3) of the central spines enlarged and swollen, forming a pedicellaria. Two of the specimens have a few similar pedicellariae on the actinal surface.

## Dytaster biserialis Sladen

Dytaster biserialis Sladen, Challenger Reports, Zoology, 30 (pt. 51): 77, pl. 10, figs. 3, 4, pl. 13, figs. 3, 4. 1889.

Locality.-Atlantis cruise 152, station 8; west of Newfoundland and south of Greenland (lat. $47^{\circ} 10^{\prime} \mathrm{N}$., long. $36^{\circ} 00^{\prime} \mathrm{W}$.) ; 2,300 fathoms; August 2, 1948. One specimen.
Notes.-In this specimen $\mathrm{R}=43 \mathrm{~mm}$., $\mathrm{r}=$ 9 mm .; there are 28 marginals.

## Dytaster mollis (E. Perrier)

Crenaster mollis E. Perrier, Expéditions scientifiques du Travailleur et du Talisman pendant les années 1880, 1881, 1882, 1883, Echinodermes: 310, pl. 18, figs. 3, a, b. 1894.

Locality.-Atlantis cruise 152 , station 20 ; west of San Miguel, Azores (lat. $37^{\circ} 50^{\prime} 30^{\prime \prime} \mathrm{N}$., long. $26^{\circ} 00^{\prime}$ W.) ; 1,400 fathoms; August 18, 1948. One specimen.
Notes.-There seems to be no doubt that this specimen represents Perrier's Crenaster mollis, which was described from a single individual dredged soutliwest of Terceira, Azores (lat. $38^{\circ}$ $38^{\prime} \mathrm{N}$., long. $27^{\circ} 26^{\prime} \mathrm{W}$.), in 2,995 meters. It does not quite agree in some respects with Perrier's description, which differs slightly from his figures, so that it appears desirable to describe it in detail.

Description. $-\mathrm{R}=40 \mathrm{~mm} ., \mathrm{r}=9 \mathrm{~mm}$. The form is stellate with the angles of the star produced into long narrow arms and the interbrachial ares broadly and regularly rounded.

The plates of the abactinal surface are small, 4 or 5 to a millimeter in the central portion of the disk and along the middle of the rays, gradually becoming larger toward the borders of the interradial areas and rather abruptly larger in the two rows adjacent to the superomarginals, both on the disk and on the arms. The plates are very delicate, thin and glassy, subcircular or polygonal, and where there are interstices between them these are bridged by thin filmy scale-like plates, the whole forming a continuous mosaic. The surface of each plate, except for a narrow glassy rim, is abruptly raised into a stout opaque cylindrical tubercle with a broadly rounded summit, these tubercles being mostly higher than thick; the large tubercles along the interradial margins of the disk are more or less capitate. Each tubercle bears on its summit a group of commonly 6-9 spines arranged in a circle, with or without a central spine. These spines are usually somewhat longer than the tubercle is high, and are slightly flaring and thorny in the distal half. The madreporite is large, situated near the interradial border and almost in contact with the superomarginals. It is surrounded by a ring of about 15 somewhat enlarged spinebearing tubercles, and carries 4 much enlarged spine-bearing tubercles on its surface.

As viewed from the side the marginals of the two series are equal in size and similar, and the superomarginals lie directly over the inferomarginals so that the line separating them, and the vertical lines separating the pairs, are straight and at right angles to each other. The marginals decrease slowly and regularly in size from the interbrachial arcs outward to the tips of the rays. In the interbrachial arcs the marginals are square, but they soon become about half again as long as broad, in the outer third of the rays slowly decreasing in length and becoming square at some distance from the tips. The inferomarginals encroach more on the actinal than the superomarginals do on the abactinal surface. There are about 30 marginals from the middle of the interbrachial arcs to the tips of the rays.

Viewed on the abactinal surface the two superomarginals in the middle of the interbrachial arcs are slightly higher (radially) than broad. The one on each side of this pair is about as long as
broad, and those following soon become about half again as long as broad, in the distal third of the ray slowly decreasing in length and becoming about as long as broad near the tip, with the last few slightly broader than long. The terminal plate is rather large, broadly truncate distally with converging sides and the inner end excavated in approximately a right angle. The superomarginals bear numerous scattered thorny spinules which are separated by about their own length. The two in the middle of each interbrachial are bear a short slender conical spine, and the one on each side of these bears two smaller spines. None of the others bear spines.

The inferomarginals are covered with scattered spinules similar to those on the superomarginals. The two in the middle of each interbrachial arc bear two median conical spines. The next 15 or 16 on each side each bear a single slender short spine decreasing in size distally, at first central and surrounded by enlarged spinules, soon losing the accompanying enlarged spinules and gradually moving to the distal end of the plates.

On the actinal surface the interactinal areas are occupied by a number of plates which are much larger than the plates of the abactinal surface and are only slightly convex. A somewhat irregular median row runs from the suture between the mouth plates to the suture between the two central inferomarginals; this includes 3 or 4 plates, except for a single plate adjoining the mouth plates, it is absent in one interactinal area. Perrier does not mention this unpaired column in his description, but it appears to be indicated in his figure of the actinal surface (1a). On each side of this there is a column of 3 plates, with a small one next the inferomarginal. Perrier says that these columns have 5 or 6 plates, but his figure seems to show 3 or 4 . These columns are followed by a column of 3 plates and a very small one, then two plates and a very small one, then about 4 single plates between the adambulacrals and inferomarginals. The two median inferomarginals each have 4 columns of plates abutting against their inner ends, and those adjacent have 2 or 3 . There are 3 columns of plates arising from the mouth plates, and 4 from the first 3 adambulacrals; usually 2 plates adjoin the fourth and fifth adambulacrals, followed by long very narrow plates between the following adambulacrals and inferomarginals. These plates bear usually $12-15$ well-spaced spinelets scattered uniformly over the surface which resemble
those of the inferomarginals and are much larger than those of the abactinal plates.

The number of adambulacrals is greater than that of the inferomarginals so that the two series do not exactly correspond until about the tenth inferomarginal, which corresponds to the thirteenth adambulacral; from this point on the two series correspond. The inner border of the adambulacrals is regularly curved and bears a comb of 9 slender spines of which the two outermost are the shortest. On the outer edge of the plate there is a straight row of 6 or 7 subequal shorter and rougher spines. In the distal third of the arms the adambulacrals develop a single long spine on the actinal surface.

The mouth plates were well described by Perrier. There are no pedicellariae.

## Goniasteridae

## Hippasterinae <br> Hippasteria phrygiana (Parelius)

Asterias phrygiana Parelius, Kgl. norwegischen Ges. Wiss. (zu Drontheim) Schriften, aus dem dänischen Übersetzt, Teil 4: 349, 350, pl. 15, figs. 1, 2. 1768.

Locality.-Atlantis cruise 152, station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime} \mathrm{N}$., long. $44^{\circ}$ $52^{\prime}$ W.); 85 fathoms; July 31, 1948. One specimen.

Notes.-This specimen is large, with $\mathrm{R}=175$ $\mathrm{mm} ., \mathrm{r}=75 \mathrm{~mm}$. The disk is subcircular and tumid, abruptly separated from the rays, which are 30 mm . wide at the base and are separated from each other by a distance of 60 mm . The rays are high and evenly rounded abactinally.

Especially remarkable is the great size of the pedicellariae. Those on the abactinal surface are 3 mm . long. On the actinal intermediate plates the numerous pedicellariac are about 5 mm . long. Each of the plates of the series between the inferomarginals and the adambulacrals bears an enormous pelicellaria; on the disk these are set at an angle of about $60^{\circ}$ to the ambulacral groove, but on the rays they are more or less at right angles to it. On the disk these pedicellariae are from 6 to 10 (mostly about 8) mm. long; on the rays they slowly decrease to 3 mm , at the end of the series, about 20 mm . from the tips.

## Asteropidae

Poraniomorpha borealis (Verrill)
Asterina borealis Verrill, Amer. Journ. Sci. 16: 213. 1878.

Locality.-Atlantis cruise 152, station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ}$ $52^{\prime}$ W.); 85 fathoms; July 31, 1948. One specimen.
Note.-The single specimen is large, with $\mathrm{R}=$ 57 mm ., $\mathrm{r}=37 \mathrm{~mm}$.

## Echinasteridae

Henricia sanguinolenta (O. F. Müller)
Asterias sanguinolenta O. F. Müller, Zoologiae Danicae Prodromus: 234. Havniae, 1776.

Locality.-Atlantis cruise 152 , station 6 ; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ}$ $52^{\prime}$ W.); 85 fathoms; July 31, 1948. Thirty-one specimens.

Note.-In these specimens $\mathrm{R}=11$ to 37 mm .

## Henricia lisa, n. sp.

Description.-The single specimen is in poor condition. It was completely encased in mud and ooze the removal of which resulted in the loss of niost of the spines.
$R=26 \mathrm{~mm} . \mathrm{r}=7 \mathrm{~mm}$. The form is stellate with the points of the star much produced. The arms taper rapidly to about 15 mm . from the center of the disk, thence slowly to the rounded tip. The interradial ares form an obtuse angle with straight sides. The disk and the stout basal portion of the arms were apparently inflated in life.

The abactinal skeleton is very dense, composed of a great number of small and mostly slightly elongated plates among which are interspersed rounded or polygonal plates, especially about the papular pores, with occasional small independent subcircular plates in the interstices. Numerous single papulae occur between the plates, except in a broad line from the middle of the interbrachial ares about half way to the center of the disk where the plates are larger and shorter than elsewhere with the inner ends elevated and imbricating, and are closely appressed against each other with no interspaces. Presumably in life this solid line of plates was depressed, forming a sulcus. All the plates are strongly and smoothly convex.
The abactinal skeleton in general resembles that of certain forms of Henricia leviuscula, but the plates are much smaller, lower, and more densely packed, all the papulae being single.

Each plate appears to bear a regular or irregular row of usually 3 or 4 , sometimes 2 or even only 1 ,
short and fine spines; on the plates in the interradial lines there are usually 2 , sometimes 1 or 3 , spines on the highest (inner) portion.

The madreporite, situated about half way between the center and margin of the disk, is large and prominent, about 2 mm . in diameter, and, in the dry specimen, is elevated above the surface of the disk. It is coral-like, but bears a number of spines scattered over its surface.
The plates of the abactinal surface are continued around the margin of the disk onto the actinal surface where they become somewhat higher with a more or less developed median crest. Except in a broad central band, a continuation of the interradial band of the abactinal surface, which reaches nearly to the mouth plates, they become aligned with their long axes at right angles to the margin of the disk and arranged in somewhat irregular transverse and longitudinal rows. The inferomarginals, scarcely distinguishable from the other plates, are separated from the adambulacrals by a single row of actinal intermediate plates which extends at the twentieth or twenty-fourth adambulacral. Near the mouth plates the plates of the actinal intermediate series are as large as, or larger than, the inferomarginals and bear a comb of 2-4 spinelets, but they soon decrease in width and become subcircular.

The two series of inferomarginals in each actinal interradial area almost meet just beyond the mouth plates, being separated by the narrow inner end of the irregular band of plates in the middle of the areas. The superomarginals are indistinguishable in these areas. There is a more or less deficient row of papulae between the inferomarginals and the actinal intermediate plates. The plates of the interradial areas bear a row of $4-6$ spinelets resembling those on the abactinal surface but longer.

The adambulacral plates are short and broad, the largest plates on the rays. They bear a regular or somewhat irregular row of 6-8 spines of which the innermost (sometimes the two innermost) is abruptly larger and stouter than the others, which are short and decrease in length outwardly. At the inner angle of the plate, deep within the furrow, there is a stout conical spine, shorter than the large spine at the end of the series on the actinal surface.

The mouth plates are about three times as long as broad. The two of each pair curve about a broad central cavity, being separated at their
outer ends but broadly in contact at their tips. Each mouth plate bears a series of about 7 stout spines along the outer edge, and a similar series along the inner edge. Each pair of mouth plates has at the tip a single unpaired spine.

Type.-U.S.N.M. no. E. 7774, from Atlantis cruise 152, station S; southeast of Newfoundland and west of the Azores (lat. $47^{\circ} 10^{\prime} \mathrm{N}$. , long. $36^{\circ} 00^{\prime}$ W.); 2,300 fathoms; August 2, 1948.
Notes.-It is with much diffidence that I propose a new specific name in this perplexing genus, but the present specimen is so different from any previously recorded that it seems reasonable to assume that it represents a new specific type. Of all the named species and forms it comes nearest to Henricia sanguinolenta eschrichtii forma tumida Verrill as represented by some specimens at hand from the Bering Sea area, with unusually dense abactinal skeletons. But the rays are tumid only in the proximal half, the skeleton is more compact and composed of smaller plates which are evenly rounded dorsally without ridges or bosses, the marginal plates are not clearly defined, the spinelets on all the plates are longer and more slender, and the papulae are invariably single.

## Pterasteridae

Pteraster militaris (O. F. Müller)
Asterias militaris O. F. Müller, Zoologiae Danicae Prodromus: 234. Havniae, 1776.

Locality.-Atlantis cruise 152, station 6, east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ} 52^{\prime} \mathrm{W}$. .); 85 fathoms; July 31, 1948. One specimen.

Notes.-The single specimen is four-rayed; $R=16 \mathrm{~mm} ., \mathrm{r}=7 \mathrm{~mm}$.

## Brisingidae

Freyella abyssicola E. Perrier
Freyelta spinosa var. abyssicota E. Perrier, Expéditions scientifiques du Travaitteur et du Tatisman pendant les années $1880,1881,1882,1883$, Échinoderines: 88. 1894. One specimen.

Locality.-Atlantis cruise 152 , station 8; east of Newfoundland and south of Greenland (lat. $47^{\circ} 10^{\prime}$ N., long. $36^{\circ} 00^{\prime} \mathrm{W}$.); 2,300 fathoms; August 2, 1948.

Notes.- The single specimen has the disk 11 mm . in diameter and the 11 rays 85 mm . long. Four of the rays, opposite the madreporite, are slightly smaller than the others.

This specimen agrees closely with Perrier's type from northeast of the Azores (lat. $42^{\circ} 19^{\prime} \mathrm{N}$., long. $23^{\circ} 36^{\prime} \mathrm{W}$.), in 4,060 meters, which also had 11 rays.

## Asteritidae

## Pedicellasterinae

## Hydrasterias ophidion Sladen

Asterias (Hydrasterias) ophidion Sladen, Chatlenger Reports, Zoology, 30 (pt. 51): 581, pl. 99 , figs. 3,4 , pl. 103, figs. 3, 4. 1889.

Locality.-Atlantis cruise 152, station 20; north of the Azores (lat. $37^{\circ} 50^{\prime} 30^{\prime \prime} \mathrm{N}$., long. $\left.26^{\circ} 00^{\prime} \mathrm{W}.\right) ; 1,400$ fathoms; August 18, 1948. $10+$ specimens.
Notes.-All the specimens have 6 rays; $\mathrm{R}=$ about 35 mm .

## Asteriinae

## Asterias vulgaris Verrill

Asterias (Asteracanthion) vutgaris (Stimpson, MS.) Verrill, Proc. Boston Soc. Nat. Hist. 10: 347. 1866.

Locality.-Atlantis cruise 152, station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime} \mathrm{N}$., long. $44^{\circ}$ $52^{\prime}$ W.); S5 fathoms; July 31, 1948. One specimen.
Note.-The single specimen is small, with $\mathrm{R}=$ 11 mm .

## OPHIUROIDEA

Ophiacanthidae
Ophiacantha abyssicola G. O. Sars
Ophiacantha abyssicota G. O. Sars, Nye Echi nod. fra den norske Kyst., Vid. Selsk. Forh. Christiania: 8. 1871.

Locality.-Atlantis cruise 152, station 26; southwest of the Azores (lat. $34^{\circ} 12^{\prime} 30^{\prime \prime}$ N., long. $30^{\circ} 12^{\prime} 30^{\prime \prime} \mathrm{W}$.); 570 fathoms; August 26, 1948. One small specimen.

Ophiactidae
Ophiactis abyssicola (M. Sars)
Amphiura abyssicola M. Sars, Norges Echin.: p. 18, pl. 2, figs. i-12. 1861.

Locality.-Atlantis cruise 152, station 11; north of the Azores (lat. $42^{\circ} 53^{\prime} 30^{\prime \prime}$ N.., long. $2905^{\prime} \mathrm{W}$.); 720 fathoms; August 10, 1945. Two specimens.

## Ophiopholis aculeata (Linné)

Asterias aculeata Linné, syst. Nat., ed. 12, 1 (pt. 2): 1101, No. 12. 1767.

Locality.-Atlantis cruise 152, station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime} \mathrm{N}$. , long. $44^{\circ}$ $52^{\prime}$ W.); 85 fathoms; July 31, 1948. Thirty-eight specimens.

Note.-All the specimens are small, the largest having the disk 9 mm . in diameter.

## Ophioliepididae

Amphiophiura convexa (Lyman)
Ophioglypha convexa Lyman, Bull. Mus. Comp. Zool. 5: 84, pl. 3, figs. 83, 84. 1878.

Localities.-Atlantis cruise 152, station 8; east of Newfoundland and south of Greenland (lat. $47^{\circ} 10^{\prime}$ N., long. $36^{\circ} 00^{\prime}$ W.); 2,300 fathoms; August 2, 1948. Eleven specimens.

Station 30; between North Carolina and the Azores (lat. $34^{\circ} 53^{\prime}$ N., long. $46^{\circ} 24^{\prime}$ W.); 2,530 fathoms; September 3, 1948. One specimen.

Notes.-The largest specimen from station 8 has the disk 15 mm . in diameter and the arms 30 mm . long. The single specimen from station 30 has the disk 12 mm . in diameter and the arms 24 mm . long.

## Ophiura sarsii Lütken

Ophiura sarsii Lütken, Vidensk. Meddel., 1854: 101. 1855.

Locality.-Atlantis cruise 152, station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ}$ $52^{\prime}$ W.); 85 fathoms; July 31, 1948. Six specimens.

Note.-The largest specimen has the disk 20 mm . in diameter.

## Ophiura irrorata (Lyman)

Ophioglypha irrorata Lyman, Bull. Mus. Comp. Zool. 5: 73, pl. 4, figs. 106-108. 1878.

Locality.-Atlantis cruise 152 , station 8 ; east of Newfoundland and south of Greenland (lat. $47^{\circ} 10^{\prime} \mathrm{N}$. , long. $36^{\circ} 00^{\prime} \mathrm{W}$. ); 2,300 fathoms; August 2, 1948. Three specimens.

Note.-The largest specimen has the disk 23 mm . in diameter and the arms 125 mm . long.

Ophiura ljungmani (Lyman)
Ophioglypha ljungmani Lyman, Bull. Mus. Comp. Zool. 5: 71, pl. 3, fig. 77. 1878.

Locality.-Atlantis cruise 152, station 11; north of the Azores (lat. $42^{\circ} 53^{\prime} 30^{\prime \prime} \mathrm{N}$., long. $29^{\circ} 05^{\prime}$ W.); 720 fathoms; August 10, 1948. Five specimens.

Note.-The largest specimen has the disk 6 mm . in diameter and the arms 16 mm . long.

Ophiocten sericeum (Forbes)
Ophiura sericea Forbes, Journ. Sutherland's Voy. 2: App.: 215. 1852.

Locality.-Atlantis cruise 152 , station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ}$ $52^{\prime}$ W.); 85 fathoms; July 31, 1948.203 specimens.
Note.-All the specimens are small, the largest with the disk about 5 mm . in diameter.

## ECHINOIDEA

## Strongylocentrotidae

Strongylocentrotus dröbachiensis (O. F. Müller)
Echinus dröbachiensis O. F. Müller, Zoologiae Danicae Prodromus: 235. Havniae, 1776.

Locality.-Atlantis cruise 152, station BT 65; 200 meters; July 21, 1948. One specimen.

Note.-The specimen is 36 mm . in diameter.

## Scutellidae

## Echinarachnius parma (Lamarck)

Scutella parma Lamarck, Hist. nat. des animaux sans vertèbres 3: 11. 1816.

Locality.-Atlantis cruise 152 , station 1; south of Nantucket, Massachusetts (lat. $40^{\circ} 50^{\prime} \mathrm{N}$., long. $70^{\circ} 10^{\prime}$ W.); 19-20 fathoms; July 16, 1948. One specimen.

Note.-The single specimen is 38 mm . in diameter.

## Palaeopneustidae

> Homolampas fragilis (A. Agassiz)

Lissonotus fragilis A. Agassiz, Bull. Mus. Comp. Zool. 1: 273. 1869.

Locality.-Atlantis cruise 152 , station 20 ; north of the Azores (lat. $37^{\circ} 50^{\prime} 30^{\prime \prime} \mathrm{N}$., long. $26^{\circ} 00^{\prime}$ W.) ; 1,400 fathoms; August 18, 1948. Fragments of 2 medium-sized specimens, one living and one dead.

## CRINOIDEA

Bourgueticrinidae
Democrinus parfaiti E. Perrier
Democrinus parfaiti E. Perrier, Comptes Rendus 96 (7): 450. 1883.

Locality.-Atlantis cruise 152, station 11; north of the Azores (lat. $42^{\circ} 53^{\prime} 30^{\prime \prime} \mathrm{N}$., long. $29^{\circ} 05^{\prime}$
W.); 720 fathoms; August 10, 1948. One specimen, without arms.

Notes.-This specimen consists of a root, stem, basals, and radials. The stem is about 105 mm . long with 55 columnals, and the basals are 3 mm . long.

## Bathycrinidae

Bathycrinus aldrichianus Wyville Thomson
Bathycrinus aldrichianus Wyville Thomson, Journ. Linn. Soc. (Zool.) 13: pp. 47-51, fig. 1. 1876.
Bathycrinus serratus A. H. Clark, Proc. U. S. Nat. Mus. 34: 205, fig. 1; 306. 1908.
Locality.-Between North Carolina and the Azores (lat. $34^{\circ} 53^{\prime}$ N., long. $46^{\circ} 24^{\prime}$ W.); 2,530 fathoms; September 3, 1948. One stem without the proximal portion, and fragments of another.

Notes. The larger fragment is about 122 mm . long with 61 columnals, tapering to a diameter of 0.4 mm . at the broken proximal end. The longest columnals, near the broken end, are 1.5 mm . long and about four times as long as broad, and are cylindrical. The other smaller fragments are from a considerably stouter stem.

Prof. Torsten Gislén has suggested to me that my Bathycrinus serratus described in 1908 from Albatross station 2226, off Virginia in 2,045 fathoms, and recorded from Albatross station 2713, off Maryland in 1,859 fathoms, is in reality a synonym of Prof. Wyville Thomson's B. aldrichianus. With this suggestion I am quite in agreement.

## LIST OF THE STATIONS, WITH THE SPECIES FOUND AT EACH

Station 1; south of Nantucket (lat. $40^{\circ} 50^{\prime} \mathrm{N}$., long. $70^{\circ} 10^{\prime} \mathrm{W}$.); 19-20 fathoms; July 16,1948 :

## Echinarachnius parma

Station 6; east of southern Newfoundland and south of Cape Farewell, Greenland (lat. $47^{\circ} 08^{\prime}$ N., long. $44^{\circ} 52^{\prime}$ W.); 85 fathoms; July 31, 1948 :

Leptychaster arcticus
Hippasteria phrygiana
Poraniomorpha borealis
Henricia sanguinolenta
Pteraster militaris

Asterias vulgaris
Ophiopholis aculeata
Ophiura sarsii
Ophiocten sericeum

Station 8; west of Newfoundland and south of Greenland (lat. $47^{\circ} 10^{\prime} \mathrm{N}$., long. $36^{\circ} 00^{\prime} \mathrm{W}$.); 2,300 fathoms; August 2, 1948:

Dytaster biserialis
Amphiophiura convexa
Henricia lisa
Ophiura irrorata
Freyella abyssicola
Station 11; north of the Azores (lat. $42^{\circ} 53^{\prime}$ $30^{\prime \prime}$ N., long. $29^{\circ} 05^{\prime}$ W.); 720 fathoms; August 10, 1948.

Ophiactis abyssicola
Democrinus parfaiti
Ophiura ljungmani
Station 20; west of San Miguel, Azores (lat. $37^{\circ} 50^{\prime} 30^{\prime \prime}$ N., long. $26^{\circ} 00^{\prime} \mathrm{W}$.); 1,400 fathoms; August 18, 1948:

Dytaster mollis
Homolampas fragilis Hydrasterias ophidion

Station 26; southwest of the Azores (lat. $34^{\circ}$ $12^{\prime} 30^{\prime \prime} \mathrm{N} .$, long. $30^{\circ} 12^{\prime} 30^{\prime \prime} \mathrm{W}$.); 570 fathoms; August 26, 1948:

## Ophiacantha abyssicola

Station 28; southwest of the Azores (lat. $34^{\circ}$ $50^{\prime} \mathrm{N}$., long. $39^{\circ} 20^{\prime} \mathrm{W}$.) ; 1,770 fathoms; August 30, 1948:

Plutonaster notatus
Station 30; between North Carolina and the Azores (lat. $34^{\circ} 53^{\prime} \mathrm{N}$., long. $46^{\circ} 24^{\prime} \mathrm{W}$.); 2,530 fathoms; September 3, 1948 :

Amphiophiura convexa
Bathycrinus aldrichianus
Station BT 65; 200 meters:
Strongylocentrotus dröbachiensis

ORNITHOLOGY.-A new race of bird of the genus Spodionnis from Venezuela. Alexander Wetnore and William H. Phelps, Jr.

The curious avian species Spodiornis rusticus, at present placed in the family Fringillidae, is of scattered and erratic distribution in Central and South America from the
${ }^{1}$ Received August 19, 1949.
mountains of eastern Veracruz in México south to northern Bolivia. In Venezucla it has been known from 10 skins of Spodiornis rusticus rusticus, the typical race, collected on Cerro del Avila in the mountain near


[^0]:    ${ }^{1}$ Contribution from the Woods Hole Oceanographic Institution No. 471 . Published by permission of the Secretary of the Smithsonian Institution. Received April 25, 1949.

